

212



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|-----------------|-------------|----------------------|---------------------|------------------|
| 09/986,178 | 11/07/2001 | Masakazu Nishikawa | Q66603 | 4955 |

7590 11/02/2005

SUGHRUE, MION, ZINN, MACPEAK & SEAS, PLLC
2100 Pennsylvania Avenue, N.W.
Washington, DC 20037-3202

| |
|----------|
| EXAMINER |
|----------|

RODRIGUEZ, GLENDA P

| | |
|----------|--------------|
| ART UNIT | PAPER NUMBER |
|----------|--------------|

2651

DATE MAILED: 11/02/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

✓
09/986,178

Applicant(s)

NISHIKAWA, MASAKAZU

Examiner

Glenda P. Rodriguez

Art Unit

2651

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 22 August 2005.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-16 and 18-22 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-16 and 18-22 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claims 1-5, 10, 12 and 14 are rejected under 35 U.S.C. 102(b) as being anticipated by Chi et al. (US Patent No. 5, 121, 258).

Regarding Claim 1, Chi et al. teach a method of magnetic transfer for performing magnetic transfer by bringing a master carrier bearing information signals and a slave medium into close contact with each other then applying a transfer magnetic field thereto, wherein the slave medium is conveyed in a manner that a recording surface of the slave medium faces vertically toward the master carrier (Col. 2, Lines 46-52 and Fig. 2, Elements 47, 51 and 52), being held in a manner that an information-bearing surface thereof is held vertically, then bringing the information-bearing surface of said master carrier and the recording surface of the slave medium into close contact with each other wherein the recording surface of the slave medium and the information-bearing surface of the master carrier are oriented substantially perpendicular to ground. (See Fig. 2, and Col. 5, Lines 22-32 and Col. 6, Lines 62-66).

Regarding Claim 2, Chi et al. teach a method for performing magnetic transfer by bringing a master carrier bearing information for transfer and a slave medium into close contact with each other then applying a transfer magnetic field thereto (Col. 2, Lines 46-52 and Fig. 2, Elements 47, 51 and 52), wherein the slave medium is held by a slave holder (Col. 4, Lines 25-

Art Unit: 2651

30. The slave medium is held between both master medium, therefore it holds the slave into close contact with the master, functioning as a slave holder.) and wherein after the slave medium is disposed on the slave holder, the slave holder is conveyed to the master carrier (See Fig. 2, and Col. 5, Lines 22-32 and Col. 6, Lines 62-66 and Col. 2, Lines 46-52 and Fig. 2, Elements 47, 51 and 52).

Regarding Claim 10, Chi et al. teach all the limitations of Claim 1. Chi et al. also teach a slave medium being held at a close contact with each other then applying a transfer magnetic field thereto by a slave holder (Col. 4, Lines 25-30. The slave medium is held between both master medium, therefore it holds the slave into close contact with the master, functioning as a slave holder.)

Regarding Claim 3, Chi et al. teach all the limitations of Claim 2. Chi et al. also teach wherein the slave medium is positioned and held at the slave holder, and an alignment of the master carrier with the slave medium is performed via the slave holder (See Fig. 2 and Col. 5, Lines 22-32, Element 24, holds the slave medium and both master carriers (Elements 50 and 48)).

Regarding Claim 4, Chi et al. teach a magnetic transfer device that performs magnetic transfer by bringing a master carrier bearing information signals and a slave medium into close contact with each other then applying a transfer magnetic field thereto (See Fig. 2, Col. 2, Lines 46-52), said magnetic transfer device comprising:

Contacting means that holds the master carrier in a manner so that an information-bearing surface of the master carrier faces vertically and that

Art Unit: 2651

brings the information-bearing surface into contact with the slave medium (Col. 5, Lines 22-32 and Col. 6, Lines 62-66);

Conveying means that conveys the slave medium in a manner so that a recording surface of the slave medium faces vertically toward said contacting means (See Fig. 2, Elements 47 and 51 are master medium and medium 52 is the slave (Col. 5, Line 22 to Col. 6, Line 10).);

And magnetic field generating means that applies a magnetic field to the slave medium and the master carrier collectively held at the contacting means (Col. 4, Lines 55-60)

Wherein the recording surface of the slave medium and the information-bearing surface of the master carrier are oriented substantially perpendicular to ground and wherein after the slave medium is disposed on the slave holder, the slave holder is conveyed to the master carrier (See Fig. 2, Elements 47 and 51 are master medium and medium 52 is the slave (Col. 5, Line 22 to Col. 6, Line 10).).

Regarding Claim 5, Chi et al. teach a magnetic transfer device that performs magnetic transfer by bringing a master carrier bearing information for transfer and a slave medium into close contact with each other then applying a transfer magnetic field thereto, said magnetic transfer device comprising:

A close contact base that positions and holds said master carrier (Col. 5, Lines 22-32 and Col. 6, Lines 62-66);

A slave holder that positions and holds said slave medium and conveys the slave medium to a position for close contact (Col. 4, Lines 25-30. See Fig. 2 and Col. 5, Lines 22-32, Element 24, Chi et al. teach that Element 24 holds the slave medium in close contact with the master carrier.);

Pressurizing means that brings the slave medium held by the slave holder and the master carrier into close contact with each other (See Fig. 2 and Col. 5, Lines 22-32, Element 24, holds the slave medium and both master carriers (Elements 50 and 48));

A positioning mechanism that aligns the close contact base with the slave holder (Col. 4, Lines 17-30. Chi et al. teaches that when the actuator is given power, it drives Element 30 to a coupling by going in the direction specified by Element 34, thus placing the master and slave into close contact.);

And magnetic field applying means that applies a transfer magnetic field to the slave medium and the master carrier that are closely contacted with each other (Col. 4, Lines 55-60).

Regarding Claim 17, Chi et al. teach all the limitations of Claim 1. Chi et al. further teach wherein the recording surface of the slave medium and the information-bearing surface of the master carrier are oriented substantially perpendicular to ground (See Fig. 2, Elements 47 and 51 are master medium and medium 52 is the slave (Col. 5, Line 22 to Col. 6, Line 10)).

Regarding Claims 12 and 14, Chi et al. teach all the limitations of Claims 1 and 2, respectively. Chi et al. further teach generating a transfer magnetic field at at least one side of

Art Unit: 2651

the slave medium wherein the transfer magnetic field is applied in a direction parallel to a tracking direction of the slave medium (Col. 4, Lines 55-60).

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

- (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 8 and 9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Chi et al. (US Patent No. 5, 121, 258) in view of Bonyhard (US Patent No. 6, 181, 492). Chi et al. teach all the limitations of Claims 1 and 4, respectively. Chi et al. fail to teach wherein information signals that are magnetically transferred to the magnetic recording medium by the method are composed of servo signals. However, this feature is well known in the art as disclosed by Bonyhard, wherein it teaches that it information signals that are magnetically transferred to the magnetic recording medium by the method are composed of servo signals (Pat. No. 6, 181, 492; See Abstract). It would have been obvious to a person of ordinary skill in the art, at the time the invention was made, to modify Chi et al.'s invention in order for the medium to magnetically transfer servo signals in order transfer servo-patterns from slave to master disc without the use of a servo writer.

5. Claims 6, 7, 11, 13, 15 and 16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Chi et al. (US Patent No. 5, 121, 258) in view of Ishida et al. (US Patent No. 6, 347, 016).

Regarding Claims 6, 11 and 13, Chi et al. teach all the limitations of Claims 5, 10 and 13, respectively. Chi et al. fail to teach wherein either a plurality of positioning pins or a plurality of

Art Unit: 2651

positioning holes are provided on the close contact base. However, this feature is well known in the art as disclosed by Ishida et al., wherein it teaches either a plurality of positioning pins or a plurality of positioning holes are provided on the close contact base (Pat. No. 6, 347, 016; See Fig. 20); either a plurality of positioning holes or a plurality of positioning pins are provided on said slave holder (Pat. No. 6, 347, 016; See Fig. 21 and Col. 28, Lines 17-26. Ishida et al. teach master (Element 201) holding a slave disk (Element 202) on close contact being held together by a plurality of bolts inserted in the holes (Elements 209).); and the positioning mechanism performs alignment by engaging the positioning pins with the positioning holes (Pat. No. 6, 347, 016; See Fig. 20). It would have been obvious to a person of ordinary skill in the art, at the time the invention was made, to modify Chi et al.'s invention in order for the medium to ensure a uniform contact between the master carrier and the slave disk.

Regarding Claim 7, Chi et al. and Ishida et al. teach all the limitations of Claim 6. Ishida et al. further teach wherein the diameters of the positioning holes are designed to be greater than those of the positioning pins (Pat. No. 6, 347, 016; See Fig. 20, The diameter of the pins (Element 209) is greater than the slave and master medium.), and the positioning pins being engaged to perform alignment (Pat. No. 6, 347, 016; See Col. 28, Lines 24-26. Ishida et al. teach a slave being held and aligned to a master for ensuring magnetic transfer.). It would have been obvious to a person of ordinary skill in the art, at the time the invention was made, to modify Chi et al.'s invention in order for the medium to ensure a uniform contact between the master carrier and the slave disk.

Regarding Claim 15, Chi et al. and Ishida et al. teach all the limitations of Claim 6. Ishida et al. further teach wherein each of the positioning pins has a smooth surface to slide into

Art Unit: 2651

a respective positioning hole (Pat. No. 6, 347, 016; Fig. 21, Ishida et al. teaches that the master and the slave being placed together by bolts in order to slide in the positioning holes.). It would have been obvious to a person of ordinary skill in the art, at the time the invention was made, to modify Chi et al.'s invention in order for the medium to ensure a uniform contact between the master carrier and the slave disk.

Regarding Claim 16, Chi et al. and Ishida et al. teach all the limitations of Claim 6. Chi et al. further teach generating a transfer magnetic field at at least one side of the slave medium wherein the transfer magnetic field is applied in a direction parallel to a tracking direction of the slave medium (Col. 4, Lines 55-60).

Response to Arguments

5. Examiner acknowledges that Claim 17 has been cancelled in Applicant's Amendment filed 8/22/05.

6. Applicant's arguments filed 8/22/05 have been fully considered but they are not persuasive. Applicant argues that the reference of Chi et al. (US Patent 5, 121, 258) that "reading into the figures a vertical orientation for the slave and master surfaces is improper since there is no indication of vertical orientation in the figures, and the text of Chi is silent on the orientation of the master and slave surfaces". However, the Examiner does not concur with the arguments given by the Applicant. According to the MPEP, "Drawings and pictures can anticipate claims if they clearly show the structure which is claimed. *In re Mraz*, 455 F.2d 1069, 173 USPQ 25 (CCPA 1972). The origin of the drawing is immaterial. For instance, drawings in a design patent can anticipate or make obvious the claimed invention as can drawings in utility patents. When the reference is a utility patent, it does not matter that the feature shown is unintended or

Art Unit: 2651

unexplained in the specification. The drawings must be evaluated for what they reasonably disclose and suggest to one of ordinary skill in the art. *In re Aslanian*, 590 F.2d 911, 200 USPQ 500 (CCPA 1979). See MPEP § 2121.04 for more information on prior art drawings as "enabled disclosures." Hence, the rejection still stands.

Conclusion

7. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Glenda P. Rodriguez whose telephone number is (571) 272-7561. The examiner can normally be reached on Monday thru Thursday: 7:00-5:00; alternate Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Hudspeth can be reached on (571) 272-7843. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2651

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).


GPR
10/31/05


DAVID HUDSPETH
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2600